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Memorandum

To: DC Demonstration Participant Group

From: My Ton, Ecos Consulting; Brian Fortenbery, EPRI Solutions Re: Notes from Wednesday, February 22 2006 Conference Call

Cc: Bill Tschudi

Date: Tuesday, February 28, 2006

Purpose:

This was a call to formalize details on definitions, logistics, location(s) and equipment as well as to address concerns over proprietary equipments/NDA.

Participants:

Bill Tschudi – LBNL

My Ton - Ecos Consulting

Ben Hartman, Paul Savage - Nextek

Janos Radja - SATCON Power Systems

Johnny Gonzalez – Pentadyne

Pavan Kumar – Intel

Mike Bushue, Dennis Symanski – Sun Microsystems

Mark Baldwin, David Geary - Baldwin Tech

Ross Ignall – Dranetz BMI

Mike Gravely - CEC

Tate Cantrell - Dupont Fabrose

Brian Fortenbery - EPRI Solutions

Peter Gross - EYP Mission Critical

IBM and Dell were invited.

Christian Belady of HP was not available

Agenda:

- CEC update
- Clarification/Definition and timing of "facility-level" versus "rack-level" and needs
- NDA/IP confidentiality concerns
- Next steps: follow up, location, logistics, kick-off date

CEC Update:

Bill Tschudi updated the group on the California Energy Commission's interest in the Demonstration project. The Commission supports having the Demonstration going forward in both forms if possible ("facility-level" and "rack-level"). Bill also reiterates that the CEC supports the Demonstration by providing facilitation and hosting discussions only, and looks to partners/participants to supply/loan the needed equipment. The CEC also is interested in the Demonstration keeping to the original schedule, completing in August 2006.

NDA/IP & Other Confidentiality Concerns:

There were some concerns expressed over the fact that Sun is hosting the facility-level demonstration, which some may not consider a "neutral" site. Dennis Symanski of Sun stated that the equipment will not be open to all of the facility staff, and access to the on-site Demonstration setup will only be possible through Dennis or Mike Bushue.

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Others were concerned over the level of reporting details (for example, performance comparisons of similar pieces of equipment). My Ton emphasized the fact that the Demonstration is intended as a "proof of concept" and to quantify overall efficiency gains of the DC architecture, and the final report will reflect this focus. There will be no discussion of individual component. In addition, the participants will all have the ability to review the final report and data prior to release.

There were also concerns over IP and attribution of prepared materials, as documents contributed by individual participants or organization and created by the group will be disseminated throughout. It was requested that any use of materials such as diagrams and images be properly attributed to authors or originating organization. Going forward, information and documents provided by the group on the Demonstration will be reviewed and credited to all participants.

My Ton requested that participants with concerns or other issues also share their NDAs or other documents concerning IP by forwarding it to him by 2/24. They will be compiled and circulated by 3/3.

Definition, Clarification & Timing:

The group agreed on the definition of "facility-level" demonstration, which will show the conversion of AC into DC at the facility level, and deliver high-voltage DC to the server rack. "Rack-level" demonstration will show the conversion of AC to DC at the rack level, and deliver DC to the servers.

With respect to timing, the equipment and instrumentation are largely available for the facility-level, and will move forward at the Sun (Newark) location. The rack-level will be moving forward concurrently, but a few of the participants were not available on the call, and they will be contacted in order to bring them up to speed.

The group also agreed not to split up into facility and rack level sub-groups, as this will present some communication and coordination challenges.

Next Steps:

- My Ton to circulate notes from call by 3/1
- My Ton to prepare a document to summarize approach and philosophy for facility-level (one-pager) by 3/3 for group comments and dissemination.
- Participants to forward NDA/IP documents & requirements for compilation
- Brian and My to establish follow up call with some participants to establish logistics and finalize the matrix of participants and available equipment for delivery to Sun's facility
- Regroup on rack-level discussion
- A kick-off meeting for facility-level, with equipment in place and ready for final assembly is scheduled for April 3, 2006 at Sun's Newark facility.